

SC15G

Universal Compressor

R134a

220-240V 50Hz

Data Sheet (Replaces CD.44.K3.02)

General

| | |
|--|--------------|
| Compressor | SC15G |
| Code number | 104G8520 |
| Code number | 104G8525 |
| Code number compressor with oil cooler | 104G8530 |

Application

| | | |
|--------------------------------|-----------------------|-----------------------|
| Application | | LBP/HBP |
| Evaporating temperature range | °C | -35 to 15 |
| Voltage range | V/Hz | LBP: 187 - 254 /50 |
| | | LBP: 198 - 254 /60 |
| | | HBP: 198 - 254 /50 |
| Motor type | | CSIR |
| Max. ambient temperature | °C | 43 |
| Comp. cooling at ambient temp. | 32°C | LBP: O/F ₁ |
| | | HBP: F ₂ |
| | 38°C | LBP: O/F ₁ |
| | | HBP: F ₂ |
| 43°C | LBP: O/F ₁ | |
| | HBP: F ₂ | |

Design

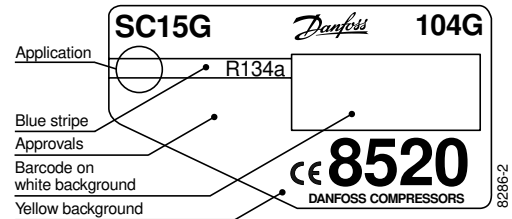
| | | |
|-------------------------------------|-----------------|------------------------------------|
| Displacement | cm ³ | 15.28 |
| Oil quantity | cm ³ | 600 (550 on comp. with oil cooler) |
| Maximum refrigerant charge | g | 1300 |
| Free gas vol. in compressor | cm ³ | 1410 |
| Weight without electrical equipment | kg | 13.1 |

Motor

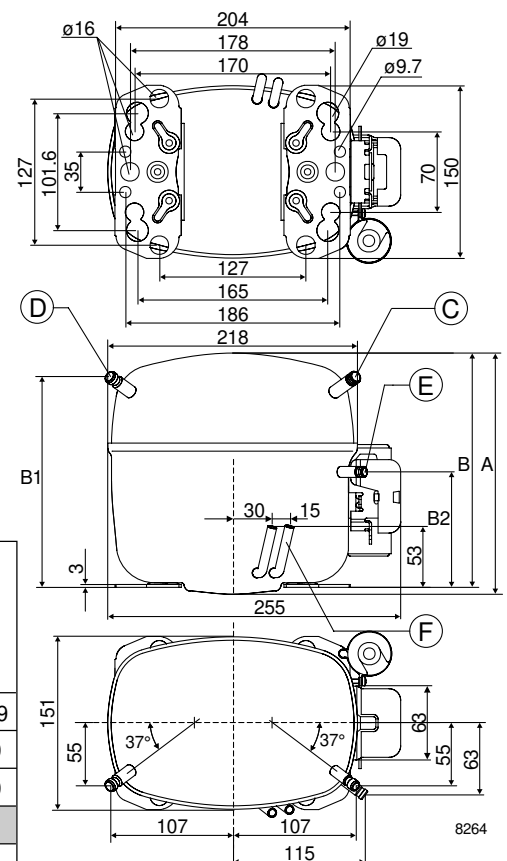
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|---|------|---------------|
| Motor size | watt | 385 |
| LRA (rated after 4 sec. UL984) HST | A | 14.8 |
| Cut-in current HST | A | 14.8 |
| Resistance, main and start winding (25°C) | Ω | 5.0/13.7 |
| Approvals | | EN 60335-2-34 |

Dimensions

| | | 104G8530 | 104G8520 | 104G8525 |
|-------------------------|------------------|----------|------------|------------|
| Height | mm | A | 209 | |
| | | B | 203 | |
| | | B1 | 183 | |
| | | B2 | 100 | |
| Suction connector | location/I.D. mm | C | 10.2 ±0.09 | 10.2 ±0.09 |
| Process connector | location/I.D. mm | D | 6.2 ±0.09 | 6.5 ±0.09 |
| Discharge connector | location/I.D. mm | E | 6.2 ±0.09 | 6.5 ±0.09 |
| Oil cooler | location/I.D. mm | F | 6.2 ±0.09 | |
| Compressors on a pallet | pcs. | | 80 | |



- S = Static cooling normally sufficient
- O = Oil cooling
- F₁ = Fan cooling 1.5 m/s
(compressor compartment temperature equal to ambient temperature)
- F₂ = Fan cooling 3.0 m/s necessary



Capacity (EN 12900/CECOMAF)

watt

| | | | | | | | | | | | |
|----------|-----|-------|-----|-----|-----|-----|-----|------|------|------|------|
| Comp. °C | -25 | -23.3 | -20 | -15 | -10 | -5 | 0 | 5 | 7.2 | 10 | 15 |
| SC15G | 224 | 255 | 322 | 440 | 579 | 737 | 915 | 1113 | 1206 | 1330 | 1565 |

Capacity (ASHRAE)

watt

| | | | | | | | | | | | |
|----------|-----|-------|-----|-----|-----|-----|------|------|------|------|------|
| Comp. °C | -25 | -23.3 | -20 | -15 | -10 | -5 | 0 | 5 | 7.2 | 10 | 15 |
| SC15G | 275 | 314 | 396 | 542 | 714 | 910 | 1132 | 1378 | 1494 | 1649 | 1945 |

Power consumption

watt

| | | | | | | | | | | | |
|----------|-----|-------|-----|-----|-----|-----|-----|-----|-----|-----|-----|
| Comp. °C | -25 | -23.3 | -20 | -15 | -10 | -5 | 0 | 5 | 7.2 | 10 | 15 |
| SC15G | 270 | 287 | 321 | 373 | 428 | 484 | 540 | 595 | 620 | 650 | 703 |

Current consumption

A

| | | | | | | | | | | | |
|----------|------|-------|------|------|------|------|------|------|------|------|------|
| Comp. °C | -25 | -23.3 | -20 | -15 | -10 | -5 | 0 | 5 | 7.2 | 10 | 15 |
| SC15G | 2.18 | 2.23 | 2.32 | 2.48 | 2.64 | 2.80 | 2.95 | 3.08 | 3.13 | 3.18 | 3.24 |

COP (EN 12900/CECOMAF)

W/W

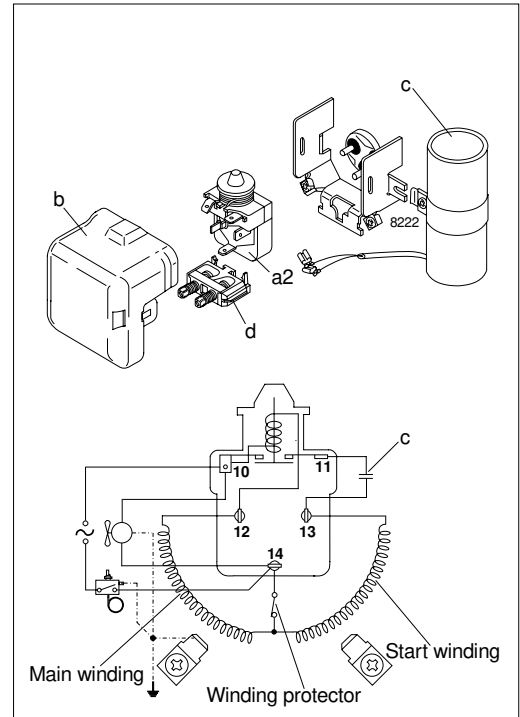
| | | | | | | | | | | | |
|----------|------|-------|------|------|------|------|------|------|------|------|------|
| Comp. °C | -25 | -23.3 | -20 | -15 | -10 | -5 | 0 | 5 | 7.2 | 10 | 15 |
| SC15G | 0.83 | 0.89 | 1.00 | 1.18 | 1.35 | 1.52 | 1.70 | 1.87 | 1.95 | 2.05 | 2.23 |

COP (ASHRAE)

W/W

| | | | | | | | | | | | |
|----------|------|-------|------|------|------|------|------|------|------|------|------|
| Comp. °C | -25 | -23.3 | -20 | -15 | -10 | -5 | 0 | 5 | 7.2 | 10 | 15 |
| SC15G | 1.02 | 1.09 | 1.24 | 1.45 | 1.67 | 1.88 | 2.10 | 2.31 | 2.41 | 2.54 | 2.76 |

| | | |
|-------------------------------|------------------|--------|
| Test conditions | EN 12900/CECOMAF | ASHRAE |
| Condensing temperature | 55°C | 55°C |
| Ambient and suction gas temp. | 32°C | 32°C |
| Liquid temperature | 55°C | 32°C |
| Fan cooling, 220V 50Hz | | |



Accessories

| Devices | Fig. | SC15G |
|-------------------------------|------|----------|
| Starting relay | a2 | 117U6005 |
| Cover | b | 103N2009 |
| Starting capacitor 80 µF | c | 117U5017 |
| Cord relief | d | 103N1004 |
| Mounting accessories | | |
| Bolt joint for one compressor | | 118-1917 |
| Bolt joint in quantities | | 118-1918 |
| Snap-on in quantities | | 118-1919 |

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